

**Applicant: Chun-Chen Chen
Application No.: 10/759,835**

REMARKS/ARGUMENTS

After the foregoing Amendments, Claims 1-16 and 20 are currently pending in this application. Claims 1 and 15 have been amended. New claims 20 and 21 have been added. Applicant submits that no new matter has been introduced into the application by these amendments.

The specification has been amended to improve readability in view of the relatively unconventional use of the word "rejected" therein which is believed to have arisen in connection with the translation of this application into English. From the context it is clear to one skilled in the art that "rejected" is used to mean "biased." This is clarified by the specification amendment. No new matter has been added.

Claim Rejections under 35 U.S.C. §103(a)

Claims 1-3 and 5-16 stand rejected under 35 U.S.C. §103(a) as being unpatentable over Applicant admitted prior art (AAPA) and in view of three references: Rigazio, U.S. Patent No. 3,260,905 ('905 Patent), Hearn, U.S. Patent No. 2,296,346, and Harris Jr., U.S. Patent No. 3,210,720. Claim 4 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over AAPA, in view of Rigazio and Harris and further in view of Schank, U.S. Pat. No. 2,097, 257.

The unique features of the proposed socket of the present invention, that a conducting piece has an opening mounted thereon for being sleeved on the second

end of the central pillar and directly and electrically connected with the second ring, the central pillar through the opening, and the second end, after assembled, of the terminal to form thereby three contact areas thereamong tightly by a purposely selected amount of an external force as recited in the amended Claim 1 are not anticipated/taught/suggested by the cited references. In claim 21, the three contact areas are individually recited. The amended Claims 1 and 15 and the newly added Claim 20 find support from the original version of the specification of the present invention. For example, see paragraphs [0024]-[0027]. Therefore, the present amendments do not introduce any new matter.

Applicant respectfully submits that the proposed socket including at least a conducting piece directly and electrically connected with the second ring, the central pillar through the opening, and the second end, after assembled, of the terminal to form thereby three contact areas thereamong tightly by a purposely selected amount of an external force as provided in the amended Claim 1 of the present invention is not disclosed by the AAPA in view of the '905 Patent. The reasons resulting in this conclusion are described as follows:

(1) The proposed socket in the present invention is not taught/disclosed/suggested by the AAPA in view of the '905 Patent since the unique features of the present invention; namely, "the conducting piece is directly and electrically connected with the second ring, the central pillar through the opening,

and the second end, after assembled, of the terminal to form thereby three contact areas thereamong tightly by a purposely selected amount of an external force”, as shown in Figs. 7-8 and described on paragraph [0025], lines 11-14: “..., riveting the second end of the terminal for tightly rejecting the conducting piece against the second ring to be assembled thereby”, on paragraph [0026] lines 10-13: “..., riveting the second end of the terminal for tightly rejecting the conducting piece against the second ring”, on paragraph [0044], lines 12-16: “...the second end 612 is riveted by an external force so that the conducting piece 63 can be fixedly and tightly rejected against the second ring 614”, on paragraph [0045] lines 1-6: “a contact plane 64 is increased as compared with the prior arts, to be a further contact area between the terminal 60 and the conducting piece 63,...There are three contact areas between the conducting piece 63 and the terminal 60,...”, and on paragraph [0048], lines 18-20: “...through riveting the second end 612 of the terminal 60, the conducting piece 63 and the terminal 60 are fixed together”, of the specification of the present invention, are not taught/disclosed/suggested by the AAPA in view of the ‘905 Patent since the ‘905 Patent and the present invention belong to the different fields respectively, and the teachings in the ‘905 Patent considered as related to the present invention by the Examiner are not recognized as to one of ordinary skill in the art in different fields. The reasons for this conclusion are further elaborated hereinafter.

(2) The AAPA doesn't teach/disclose/suggest that the conducting piece is directly and electrically connected with the second ring, the central pillar through the opening, and the second end, after assembled, of the terminal to form thereby three contact areas thereamong tightly by a purposely selected amount of an external force, as evidence by Fig 4 and described on paragraph [0004], lines 10-13 of the specification of the present invention. In the '905 Patent, the conducting piece 20 (indicated by the Examiner) is actually a "spring" 20 having two legs 20b included in a terminal stud assembly (which further includes a terminal stud 21 with annular shoulders 25/26 intermediate its opposite ends 21/27 and a circular washer 19) for insertion as a unit into an open end of a capacitor container (as shown in Fig. 2 and column 2, lines 56-61 of the '905 Patent), stacked on one of the opposite ends 27 of the terminal stud 21, engaged against the washer 19, mounted coaxially of the washer 19, and having a smaller dimension than a diameter of the washer 19. The '905 Patent belongs to the field of the capacitor and the method of manufacturing the same as described on column 1, lines 10-11 of the '905 Patent. However, the present invention belongs to the field of the socket and the method for forming the same as described on Paragraph [0001], lines 1-2. In the field of the capacitor and the method of manufacturing the same, using the '905 Patent as an example, a capacitor with relatively less components and lower manufacturing costs is the focus, and the capacitor adapted for use principally in ignition and magneto

applications for mechanical contact type associations therewith is provided (as described in column 1, lines 18-24 and 46-48 of the '905 Patent). Besides, the aforementioned spring 20 is proposed to offer a very low contact resistance between the legs (20b) of the spring 20 and the other winding electrode of the foil winding 17 (as shown in Fig. 2 and column 1, lines 41-44 of the '905 Patent). But in the field of the socket and the method of forming the same, using the present invention as an example, the focuses are on increasing the contact areas of the conducting piece and the terminal, avoiding the unstable power supply from the melted main body, which is caused by the heat produced during operation, and increasing safety of the socket (as shown in Figs. 7-8, and as described on aforementioned Paragraph [0045], lines 1-12: "a contact plane 64 is increased as compared with the prior arts, to be a further contact area between the terminal 60 and the conducting piece 63,... There are three contact areas between the conducting piece 63 and the terminal 60,...even the conducting piece 63 is loosed, the conducting piece 63 still will be contacted with the terminal unless the conducting piece 63 is completely departed from the terminal 60...a contact plane between the terminal and the conducting piece is increased so that the unstable power supply can be significantly reduced and the conduction stability of the socket also can be increased", on Paragraph [0046], lines 1-18: "...the contact manner among the terminal 60, the conducting piece 63 and the main body 62 is obviously safer because...the conducting piece 63 is rejected against

the second ring 614, which is also made of a conducting material, and not the plastic main body, which will be melted due to the heat produced during operation...even though the main body is melted, it will only occur at a position which does not influence the fixity of the conducting piece...the elements ...are more limited to each other, the loose caused by a melted main body can therefore be reduced..." and on Paragraph [0053], lines 3-6: "...is advantageous of increasing the contact areas of the conducting piece and the terminal, avoiding the unstable power supply from the melted main body, which is caused by the heat produced during operation, and increasing the usage safety of the socket", of the specification of the present invention). Critical issues such as increasing the contact areas of the conducting piece and the terminal, avoiding the unstable power supply from the melted main body, and increasing safety of the socket are not taught in the '905 Patent. Thus, one skilled in the field of the socket and the method of forming the same would not be inspired or taught by the '905 Patent, which belongs to the field of the capacitor and the method of manufacturing the same.

(3) Furthermore, regarding the teachings of having a conducting piece directly and electrically connected with the second ring, the central pillar through the opening, and the second end, after assembled, of the terminal to form thereby three contact areas thereamong in the '905 Patent as so considered by the Examiner, which belongs to the field of the capacitor and the method of

manufacturing the same, are not recognized as the common knowledge of one of ordinary skill, shared by different fields. Otherwise, there should be at least one Patent, which employs the aforementioned teachings of the '905 Patent, in the field of the socket and the method of forming the same with a patented date later than that of the '905 Patent (July 12, 1966). Since the esteemed examiner could only find the '905 Patent as a prior art employed to reject the previously amended Claim 1 of the present invention, a conclusion could be drawn that there is not any patent in the field of the socket and the method of forming the same, which does teach/disclose/suggest that the aforementioned teachings of the '905 Patent. Thus, the aforementioned teachings of the '905 Patent are not recognized as the common knowledge shared by different fields such as the capacitor and the method of manufacturing the same and the socket and the method of forming the same.

(4) Still the AAPA in view of '905 Patent does not teach the unique features disclosed in the amended Claim 1 that the conducting piece is directly and electrically connected with the second ring, the central pillar through the opening, and the second end, after assembled, of the terminal to form thereby three contact areas thereamong tightly by a purposely selected amount of an external force (between the riveted second end 612 and the conducting piece 63: "the contact plane 64", the conducting piece 63 and the second ring 614 as shown in Fig. 7 and as described on Paragraph [0044], lines 12-16, and on Paragraph [0045], lines 1-4

respectively, and the circular contact 40 formed between the central pillar 12 and the conducting piece 13, which must be formed tightly so as to result in a contact area, as shown in Fig. 4 and as described on Paragraph [0004], lines 14-15 respectively).

(5) The spring 20 of the '905 Patent includes a base 20a and legs 20b. The base has a central opening and the stud section 22 is engaged therein and provided with a riveted end 27 securing the washer 19 as well as the spring 20 in unitary assembly with the stud 21 (in column 2 lines 56-59 of the '905 Patent). As for the features disclosed in the '905 Patent: "provided with a riveted end 27 securing the washer 19 as well as the spring 20 in unitary assembly with the stud 21", one with an ordinary skill in the field would know that there could be at least three alternatives through the descriptions mentioned above. If the riveted end 27 is riveted by a relatively smaller force, the edges around the upper surface of the riveted end 27 could only touch the spring 20 by its lower surface of the base 20a. If the riveted end 27 is riveted by a relatively medium force, part of the upper surface of the riveted end 27 is contacting with the spring 20 by part of the lower surface of the base 20a. If the riveted end 27 is riveted by a relatively larger force, the whole upper surface of the riveted end 27 could be totally in contact with the spring 20 by its lower surface of the base 20a. Also, one of the opposite ends 27 is enlarged for maintaining the spring 20 and the washer 19 in assembled relation with the stud 21

as so disclosed in Claim 8 of the '905 Patent. By the same token, one with an ordinary skill in the field would know that there could be at least three possibilities potentially resulting from the descriptions, the same as above-mentioned, in Claim 8 of the '905 Patent. But in the present invention, the critical issue is to form a contact area, i.e. a contact plane, between the riveted second end of the terminal and the conducting piece such that the contact areas between the conducting piece and the terminal could be increased and the unstable power supply from the melted main body could be avoided as described (as shown in Figs. 7-8, and as described on aforementioned Paragraph [0045], lines 1-12). Thus, a conclusion could be drawn that there is no such teachings of "the conducting piece is directly and electrically connected with the second ring, the central pillar through the opening, and the second end, after assembled, of the terminal to form thereby three contact areas thereamong tightly by a purposely selected amount of an external force" disclosed in '905 Patent.

(6) Thus, the AAPA and the '905 Patent do not teach/disclose/suggest the unique features disclosed in the amended Claim 1 of the present invention that the conducting piece is directly and electrically connected with the second ring, the central pillar through the opening, and the second end, after assembled, of the terminal to form thereby three contact areas thereamong tightly by a purposely selected amount of an external force according to the above-mentioned descriptions

and analyses.

(7) The advantages of having the conducting piece directly and electrically connected with the second ring, with the central pillar through the opening, and with the second end, after assembled, of the terminal to form thereby three contact areas thereamong tightly by a purposely selected amount of an external force in the proposed socket over the conventional socket of the prior art are that the contact areas of the conducting piece and the terminal are increased, the unstable power supply can be significantly reduced and the conduction stability of the socket also can be increased as mentioned in the specification of the present invention on paragraph [0045], lines 1-12, and on paragraph [0053], lines 3-6. As for the purposely selected amount of the external force, which is employed to the riveted (assembled) second end 612 of the terminal 60 and is selected based at least in part on forming the contact area, a contact plane 64, between the riveted (assembled) second end 612 of the terminal 60 and the conducting piece 63 (as disclosed in the amended Claim 15 and newly added Claim 20), is employed such that conducting piece 63 can be fixedly and tightly rejected against the second ring 614 and significantly reduce the unstable power supply as described on Paragraph [0044], lines 12-16, and on Paragraph [0045], lines 1-12, and as shown in Fig. 7. On the contrary, one with an ordinary skill in the field would know that an arbitrary amount of the external force could not achieve the appropriate result of forming the

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contact area, a contact plane 64, between the riveted (assembled) second end 612 of the terminal 60 and the conducting piece 63 properly.

From the above, it is clear that the currently amended Claim 1 of the present invention could not be taught, disclosed, or suggested by the AAPA in view of the '905 Patent. The currently amended Claim 1 of the present invention is thus patentable over the AAPA in view of the '905 Patent.

Accordingly, Applicant requests reconsideration and withdrawal of the rejection directed to Claim 1.

Claims 2-16, and 20 are dependent from the currently amended Claim 1 and therefore, are also patentable over the cited prior art.

For the above reasons, Applicants respectfully request reconsideration and withdrawal of the rejections under 35 U.S.C. 103.

Conclusion

If the Examiner believes that any additional minor formal matters need to be addressed in order to place this application in condition for allowance, or that an interview will help to materially advance the prosecution of this application, the Examiner is invited to contact the undersigned at the Examiner's convenience.

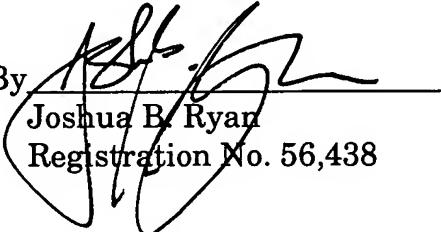
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In view of the foregoing amendments and remarks, Applicant respectfully submits that the present application, including claims 1-16 and 20, is in condition for allowance. Reconsideration of the claims and a notice of allowance are respectfully requested.

Respectfully submitted,

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